IN THE CLAIMS:

Please **amend** the claims as follows:

1. (Original) A monolithic, side pumped, passively Q-switched, solid-state laser comprising a laser resonator composite structure comprised of a laser gain medium optically contacting a passive Q-switch, wherein the composite structure comprises end faces forming a linear optical path resonant cavity therebetween, the end faces comprising at least partially reflecting coatings deposited thereon, the gain medium comprising a side face for receiving pump light.

2. (Original) The solid-state laser as in claim 1, where the pump light is generated by a laser diode array.

3. (Original) The solid-state laser as in claim 1, where the pump light is generated by a flashlamp.

4. (Original) The solid-state laser as in claim 1, where the at least partially reflecting coatings are deposited on resonator mirrors external to the resonant cavity.

5. (Original) The solid-state laser as in claim 1, further comprising a non-linear optical material optically coupled to the composite structure.

6. (Original) The solid-state laser as in claim 5, where an intra-cavity portion of the resonant cavity comprises the non-linear optical material.

7. (Original) The solid-state laser as in claim 5, where an external portion of the resonant cavity comprises the non-linear optical material.

8. (Original) The solid-state laser as in claim 5, where the non-liner optical material

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comprises one of: a frequency doubling crystal, a Raman crystal and an optical parametric oscillator.

9. (Original) The solid-state laser as in claim 1, where the laser gain medium comprises one of Nd:YAG, Nd:YVO$_4$, Er:YAG, Er:Glass, Ho:YAG and Tm:YAG.

10. (Original) The solid-state laser as in claim 1, where the passive Q-switch comprises Cr:YAG.

11. (Original) The solid-state laser as in claim 1, comprising means for thermally induced aberration compensation.

12. (Original) The solid-state laser as in claim 11, where the means for compensation comprises a tilt in at least one of the end faces.

13. (Original) The solid-state laser as in claim 11, where the means for compensation comprises a Porro prism.

14. (Currently amended)   A method for fabricating a monolithic, side pumped, passively Q-switched, solid-state laser, comprising:

placing a saturable absorber material in optical contact with a face of an optical gain material to form a composite structure ,wherein the composite structure comprises end faces forming a linear optical resonant cavity therebetween;

cutting the composite structure into a plurality of sub-structures each comprising a length of the optical gain material that is to function as a laser gain medium and that is optically contacting a length of the saturable absorber material that is to function as a passive Q-switch; and

blocking up a plurality of the sub-structures and polishing a side surface of each of the sub-structures that is to function as a pump radiation receiving surface.

15. (Original) The method as in claim 14, further comprising optically coupling the pump radiation receiving surface of a sub-structure to a source of pump radiation.

16. (Currently amended) The method as in claim 14, where the step of placing further comprises polishing and coating said end faces of the composite structure such that the end face located in the optical gain material is made a high reflector at a wavelength of interest, and such that the end face located in the saturable absorber material is made a partial reflector at the wavelength of interest.

17. (Original) The method as in claim 14, further comprising depositing an anti-reflective coating on the polished side surface.

18. (Original) The method as in claim 17, where depositing comprises one of e-beam depositing and sputtering.

19. (Original) The method as in claim 17, wherein the anti-reflective coating comprises a multi-layered interference stack-type coating.

20. (Original) The method as in claim 14, where placing comprises a diffusion bonding process.

21. (Original) The method as in claim 14, where placing comprises applying an adhesive.

22. (Original) The method as in claim 14, where placing comprises depositing the saturable absorber material using liquid phase epitaxy.

23. (Original) The method as in claim 14, where placing comprises providing a structure co-doped with an optical gain material and a saturable absorber as the composite structure.

24. (Original)The method as in claim 14, further comprising incorporating at least one thermal aberration compensation feature in the composite structure.

25. (Currently amended)   A solid-state laser comprising a laser resonator composite structure comprised of a laser gain medium, wherein the composite structure comprises at least two surfaces forming a <u>linear optical path</u> resonant cavity therebetween, and at least one surface of the at least two surfaces is adapted for thermal aberration compensation.

26. (Original) The solid-state laser of claim 25, where the composite structure comprises a passive Q-switch.

27. (Original) The solid-state laser of claim 25, where the at least one surface comprises a tilt.

28. (Original) The solid-state laser of claim 27, where the tilt comprises an angle of about 180 μRad.

29. (Original) The solid-state laser of claim 25, where the at least one surface comprises a Porro prism.

30. (Original) The solid-state laser of claim 25, where the laser comprises a monolithic laser.

31. (Original) The solid-state laser of claim 25, where the composite structure is adapted for receiving pump light from at least one of a side and an end.

32. (Original) The solid-state laser of claim 25, where the gain medium comprises a saturable absorber material.

33. (Original) The solid-state laser of claim 25, further comprising a non-linear optical material optically coupled to the composite structure.

Please **add** the following new claims:

34. (New) The solid state laser as in claim 1, wherein said end faces forming said linear optical path resonant cavity therebetween are each disposed at least substantially parallel at an orthogonal angle about zero degrees relative to a longitudinal axis defined by said linear optical path resonant cavity.

35. The method of claim 14, wherein said end faces forming said linear optical path resonant cavity therebetween are each disposed at least substantially parallel at an orthogonal angle about zero degrees relative to a longitudinal axis defined by said linear optical path resonant cavity.

36. The solid state laser of claim 25, wherein said at least two surfaces forming said linear optical path resonant cavity therebetween are each disposed at least substantially parallel at an orthogonal angle about zero degrees relative to a longitudinal axis defined by said linear optical path resonant cavity.